

Patent No. 7,618,729  
Request for Cert. of Correction dated February 8, 2010  
Attorney Docket No. 4174-050884

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Patent No.	:	7,618,729	Application No.	10/529,445
Inventors	:	Ryoichi et al.	Confirmation No.	8096
Issued	:	November 17, 2009		
Title	:	Liquid Fuel Direct Supply Fuel Cell System And Its Operation Controlling Method And Controller		
Examiner	:	John S. Maples		
Customer No.	:	28289		

REQUEST FOR CERTIFICATE OF CORRECTION OF PATENT  
FOR PTO MISTAKE (37 C.F.R. 1.322(a))

Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

ATTENTION: Decision and Certificate of Correction Branch  
Patent Issue Division

Sir:

In accordance with 35 U.S.C. § 254, we attach hereto Form PTO/SB/44 and a copy of proof of PTO errors and request that a Certificate of Correction be issued in the above-identified patent. The following errors appear in the patent as printed:

Column 18, Lines 20- 21, Claim 3, "and has the protonic" should read – and the protonic –  
(See the Amendment dated December 15, 2008, page 4, Line 6 of Claim 20. Claim 20 issued as Claim 3.)

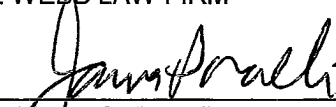
Column 18, Line 30, Claim 4, "claim 1" should read – claim 3 –  
(See the Amendment dated December 15, 2008, page 4, Line 2 of Claim 21. Claim 21 issued as Claim 4 and Claim 20 issued as Claim 3.)

Column 18, Lines 40-41, Claim 5, "separator of in the anode" should read  
– separator in the anode –  
(See the Amendment dated December 15, 2008, page 5, Line 3 of Claim 22. Claim 22 issued as Claim 5.)

Respectfully submitted,

THE WEBB LAW FIRM

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I certify that this correspondence is being electronically submitted to the United States Patent and Trademark Office on February 8, 2010.

02/08/2010

Date

Signature

Mary Jo Sinicrope

(Typed Name of Person Signing Certificate)

**UNITED STATES PATENT AND TRADEMARK OFFICE  
CERTIFICATE OF CORRECTION**

Page 1 of 1

PATENT NO. : 7,618,729  
APPLICATION NO. : 10/529,445  
ISSUE DATE : November 17, 2009  
INVENTORS : Ryoichi et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

Column 18, Lines 20- 21, Claim 3, "and has the protonic" should read – and the protonic –

Column 18, Line 30, Claim 4, "claim 1" should read – claim 3 –

Column 18, Lines 40-41, Claim 5, "separator of in the anode" should read  
– separator in the anode –

MAILING ADDRESS OF SENDER: The Webb Law Firm  
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This collection of information is required by 37 CFR 1.322, 1.323, and 1.324. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1.0 hour to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-2450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Attention Certificate of Corrections Branch, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

*If you need assistance in completing the form, call 1-800-PTO-9199 and select Option 2.*

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

/ Application No. : 10/529,445 Confirmation No. : 8096  
Applicants : Okuyama RYOICHI et al.  
Filed : March 28, 2005  
Title : **Liquid Fuel Direct Supply Fuel Cell System and Its  
Operation Controlling Method and Controller**  
Group Art Unit : 1795  
Examiner : John S. MAPLES  
Customer No. : 28289

Mail Stop Amendment  
Commissioner for Patents  
P. O. Box 1450  
Alexandria, VA 22313-1450

AMENDMENT

Sir:

In response to the Office Action dated September 15, 2008, Applicants submit the following amendments and remarks.

**Amendments to the Specification** are reflected in the substitute specification submitted herewith.

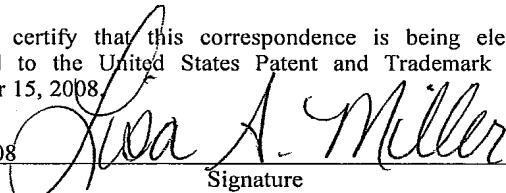
**Amendments to the Claims** are reflected in the listing of claims which begins on page 3 of this paper.

**Amendments to the Drawings** begin on page 9 of this paper and include both an attached replacement sheet and an annotated sheet showing changes.

**Remarks** begin on page 10 of this paper.

I hereby certify that this correspondence is being electronically submitted to the United States Patent and Trademark Office on December 15, 2008.

12/15/2008  
Date

  
Signature

Lisa A. Miller

Typed Name of Person Signing Certificate

of water from the water tank to the fuel tank, and a control of a supply of the liquid fuel from the fuel tank to the generator, on the basis of the output signal from the sensor.

Claim <sup>2.</sup>19 (Previously Presented): A liquid fuel direct supply fuel cell system according to claim 18, wherein:

a second temperature detector is installed in at least one place around the fuel inlet of the generator or around the fuel outlet of the generator, for detecting a temperature around the place, to measure heat generated by the liquid fuel, permeated through the electrolyte membrane of the monitor cell and oxidized by the cathode, on the basis of a difference between the signal from the temperature detector of the sensor and the signal from the second temperature detector.

Claim <sup>3.</sup>20 (Currently Amended): A liquid fuel direct supply fuel cell system according to claim 18, wherein:

the oxidizing agent is air,

5 the sensor has at least one pair of separators, in which a via hole for air inlet and a via hole for air outlet and a via hole for fuel inlet and a via hole for fuel outlet are made, and has the protonic conductive polymer electrolyte membrane and the anode and the cathode of the sensor are disposed between the separators,

each cell of the generator has separators, in which a via hole for air inlet and a via hole for air outlet and a via hole for fuel inlet and a via hole for fuel outlet are made, and the sensor is arranged in a side for the fuel inlet to the generator.

10 Claim <sup>4.</sup>21 (Currently Amended): A liquid fuel direct supply fuel cell system according to <sup>3.</sup>claim 20, wherein:

5 the generator has an anode side endplate and an anode side terminal plate in the at one end of a the plurality of cells and a cathode side endplate and a cathode side terminal plate in at the other end; and

the sensor is installed between the endplate and the terminal plate of the anode side.

Claim <sup>5.</sup>22 (Currently Amended): A liquid fuel direct supply fuel cell

system according to claim 8 <sup>3</sup>~~20~~, wherein:

3 the temperature detector is mounted on an ~~opposite plane~~ a reverse side of the protonic conductive electrolyte membrane of the separator of in the anode side of the sensor.

<sup>6.</sup>  
Claim ~~23~~ (Previously Presented): A liquid fuel direct supply fuel cell system according to claim ~~18~~, wherein:

a fuel concentration decline is detected from an increase in the temperature compensated electromotive force, between the anode and the cathode, and a fuel concentration rise is detected from a decrease in the temperature compensated electromotive force.

<sup>7.</sup>  
Claim ~~24~~ (Previously Presented): A liquid fuel direct supply fuel cell system according to claim ~~23~~, further including:

a means for determining a slope of a change in the temperature compensated electromotive force at a start of operation.

<sup>8.</sup>  
Claim ~~25~~ (Previously Presented): A liquid fuel direct supply fuel cell system according to claim ~~24~~, further including:

a means for getting the temperature of the generator and for subjecting the fuel concentration to an open loop control, separately from the temperature compensated electromotive force, until the generator reaches a predetermined temperature, at the start of operation.

<sup>9.</sup>  
Claim ~~26~~ (Currently Amended): A method for the liquid fuel direct supply fuel cell system, comprising:

*Per Ex. Amendment -*  
a generator having a plurality of cells connected serially or in parallel, ~~the cell~~ *wherein at least one of the cells has* in which an anode and a cathode <sup>→ which</sup> are oppositely installed through a protonic conductive polymer electrolyte membrane, a liquid fuel is supplied from a fuel inlet to the anode and is exhausted from a fuel outlet, and an oxidizing agent gas is supplied from a gas inlet to the cathode and is exhausted from a gas outlet;

a fuel tank for storing a the liquid fuel to be supplied to the anode;

a high concentration fuel tank for storing a high concentration fuel used for